

## REMARKS

Claims 29, 33, 37 and 41-53 are pending in the present application with all claims amended. The Examiner finally rejected the claims under § 103(a) as being unpatentable over Moline in view of either Isozaki or Shioda. Pursuant to 37 C.F.R. § 1.114, Applicants submit this Amendment with a request for continued examination to withdraw the finality of the rejection. Reconsideration and reexamination are respectfully requested.

The present invention is directed generally to buffering technologies for buffering data over a communications network. The present invention may be used, for example, to buffer data from a concert hall over a communications network to a home computer. One feature of the present invention is that buffering is based on the time information at the concert hall, rather than at the home computer. The home computer receives the time information from the concert hall, adjusts the received time information based on some predetermined value and then uses the adjusted time as the basis for processing the data.

All the claims recite the feature of *adjusting* received data containing time information to set second time information at the receiving end. For example, claim 29 recites “a receiver that receives music data containing first time information representing first time from said external device via the public communications line” and “a setting device that sets second time as second time information for the music data processing apparatus by subtracting a predetermined value from said first time”. Claim 41 recites “a controlling device that rectifies said first time information by a predetermined value and sets the rectified time information as second time information for the music data processing apparatus when said judging device judges said received music data is specific data”.

As discussed in the interview on August 14, 2002, Moline does not disclose the recited feature of adjusting the time information from an external device to set a second time at the receiving end. Col. 8, lines 63-67 of Moline discloses sending a MIDI file over the Internet. The time information for the events in the MIDI file are not in any way adjusted and then used to set

a second time at the receiving end as recited in the claims. As Col. 13, lines 7-19 make clear, the receiving end 619 has a server start time, which is the system time at which receiving end 619 creates the buffer. A delay period is added to the server start time to obtain a play start time. The received time stamp of each event is then added to the server start time and compared to the play start time to determine if enough track has been stored. Thus, there is no disclosure or suggestion that the received time stamp of each event is adjusted and then used to set the time for receiving end 619 as set forth above.

The other cited references also do not disclose the above recited feature. Isozaki is directed to a data processing apparatus for encoding data. It does not disclose or suggest adjusting received data containing time information to set second time information at the receiving end. Nor does Shioda. Shioda is directed to a sound effect creating device that is capable of automatically delaying a musical tone to impart a repeat effect. The delay time is calculated in accordance with timing clocks of the MIDI signal. However, Shioda does not disclose or suggest *adjusting* received data containing time information to *set* second time information at the receiving end.

Accordingly, Applicant respectfully submits that the claims are not anticipated by or obvious in view of the cited references (either alone or in combination).

Finally, Applicant notes that the claims have been amended to recite that the received data is music data. This amendment is made not to distinguish the claims over the cited references, but rather to focus the claims on the environment in which the invention is used.

Applicant respectfully submits that all of the pending claims in the present application are in condition for allowance. If the Examiner feels that it would advance the prosecution of the application, it is respectfully requested that the Examiner telephone the attorney of record.

Attached hereto is a marked-up version of the changes made to the claims by the current amendment. The attached page is captioned "Version with markings to show changes made".

**VERSION WITH MARKINGS TO SHOW CHANGES MADE**

**In the claims:**

Claims 29, 33, 37 and 41-53 have been **amended** as follows:

29. (Amended Four Times) A [communications] music data processing apparatus connecting to an external device via a public communications line and processing music data received from the external device via the public communications line, comprising:

a receiver that receives music data containing first time information representing first time from said external device via the public communications line;

a setting device that sets second time as second time information for the [communications] music data processing apparatus by subtracting a predetermined value from said first time;

a memory that temporarily stores the music data received by said receiver; and

a processor that periodically counts up said second time information and starts processing the music data temporarily stored in said memory when said second time information reaches said first time information.

33. (Amended Four Times) A [communications] music data processing method performed by a [communications] music data processing apparatus connecting to an external device via a public communications line and processing music data received from the external device via the public communications line, said method comprising the steps of:

- (a) receiving music data containing first time information representing first time from said external device via the public communications line;
- (b) setting second time as second time information for the [communications] music data processing apparatus by subtracting a predetermined value from said first time;
- (c) temporarily storing the music data received by said receiving step;
- (d) periodically counting up said second time information; and
- (e) starting to process the music data temporarily stored in said storing step when said second time information reaches said first time information.

37. (Amended Four Times) A storage medium storing a program, which a computer executes to realize a [communications] music data process for a [communications] music data processing apparatus connecting to an external device via a public communications line and processing music data received from the external device via the public communications line, comprising the instructions for:

- (a) receiving music data containing first time information representing first time from said external device via the public communications line;
- (b) setting second time as second time information for the [communications] music data processing apparatus by subtracting a predetermined value from said first time;
- (c) temporarily storing the [control data blocks] music data received by said receiving step;
- (d) periodically counting up said second time information; and
- (e) starting to process the music data temporarily stored in said storing step when said second time information reaches said first time information.

41. (Amended Three Times) A [communications] music data processing apparatus connecting to an external device via a public communications line, comprising:

a receiver that receives music data containing first time information from said external device via the public communications line;

a judging device that judges whether said received music data is specific data or not;

a controlling device that rectifies said first time information by a predetermined value and sets the rectified first time information as second time information for the [communications] music data processing apparatus when said judging device judges said received music data is specific data and does not set the first time information as the second time information when said judging device judges said received music data is not specific data;

a memory that temporarily stores said received music data;

a processor that counts up the second time information periodically and processes the stored music data in accordance with said counted up second time information and the first time information contained in the music data to be processed.

42. (Twice Amended) A [communications] music data processing apparatus according to claim 41, wherein said first time information contained in the music data received from the external device is absolute time added at the external device.

43. (Twice Amended) A [communications] music data processing apparatus according to claim 41, wherein said receiver further receives a value for rectifying the first time information from the external device, and

said controlling device rectifies said first time information with said received value.

44. (Twice Amended) A [communications] music data processing apparatus according to claim 41, further comprising a determiner that determines the predetermined value for rectifying the first time information in accordance with capacity of said memory for storing the received music data, and wherein the setting device rectifies said time information with said determined value.

45. (Amended Three Times) A [communications] music data processing method performed by a [communications] music data processing apparatus connecting to an external device via a public communications line, said method comprising the steps of:

- (a) receiving music data containing first time information from said external device via the public communications line;
- (b) judging whether said received music data is specific data or not;
- (c) rectifying said first time information by a predetermined value and setting the rectified first time information as second time information for the [communications] music data processing apparatus when said judging step judges said received music data is specific data and not setting the first time information as the second time information when said judging step judges said received data is not specific data;
- (d) temporarily storing said received music data; and
- (e) counting up the second time information periodically and processing the stored music data in accordance with said counted up second time information and the first time information contained in the music data to be processed.

46. (Amended Three Times) A storage medium storing a program, which a computer executes to realize a [communications] music data process for a [communications] music data processing apparatus connecting to an external device via a public communications line, comprising the instructions for:

- (a) receiving music data containing first time information from said external device via the public communications line;
- (b) judging whether said received music data is specific data or not;
- (c) rectifying said first time information by a predetermined value and setting the rectified first time information as second time information for the [communications] music data processing apparatus when said judging step judges said received music data is specific data and not setting the first time information as the second time information when said judging step judges said received music data is not specific data;
- (d) temporarily storing said received music data; and
- (e) counting up the second time information periodically and processing the stored music data in accordance with said counted up second time information and the first time information contained in the data to be processed.

47. (Amended) A [communications] music data processing apparatus according to claim 29, wherein:

said receiver further receives recovery data for recovering music data not received [by the communications data processing apparatus] due to a communications error, the recovery data containing third time information;

said memory further stores said received recovery data temporarily; and

said processor further processes said stored recovery data when said second time information reaches said third time information.

48. (Twice Amended) A [communication] music data processing apparatus according to claim 29, further comprising:

a checking device that checks a time sequential flow of music data temporarily stored in said memory; and

a remover that removes ~~unnatural data~~ from the flow of music data stored in said memory to prevent production of an unnatural musical tone, wherein

said music data temporarily stored in said memory contains data related to volume of a musical tone, and

said unnatural data is data which rapidly changes volume of a musical tone.

49. (Amended) A [communications] music data processing apparatus according to claim 41, wherein said specific data is initial data received from the external device.

50. (Amended) A [communications] music data processing method according to claim 33, wherein:

    said receiving step further [receiving] receives recovery data for recovering music data not received [by the communications data processing apparatus] due to a communications error, the recovery data containing third time information;

    said storing step further [storing] stores said received recovery data temporarily; and

    said starting step further [starting] starts to process said stored recovery data when said second time information reaches said third time information.

51. (Twice Amended) A [communications] music data processing method according to claim 33, further comprising the steps of:

(f) checking a time sequential flow of data temporarily stored in said memory; and

(g) removing unnatural data from the flow of music data stored in said memory to prevent production of an unnatural musical tone, wherein  
said music data temporarily stored in said memory contains data related to volume of a musical tone, and  
said unnatural data is data which rapidly changes volume of a musical tone.

52. (Amended) A storage medium storing a program according to claim 37, wherein:  
said receiving step further [receiving] receives recovery data for recovering music data not received [by the communications data processing apparatus] due to a communications error, the recovery data containing third time information;  
said storing step further [storing] stores said received recovery data temporarily; and  
said starting step further [starting] starts to process said stored recovery data when said second time information reaches said third time information.

53. (Amended) A storage medium storing a program according to claim 37, further comprising the instructions for:

(f) checking a time sequential flow of music data temporarily stored in said memory; and

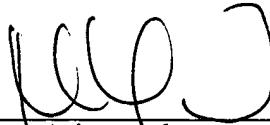
(g) removing unnatural data from the flow of music data stored in said memory to prevent production of an unnatural musical tone, wherein

said music data temporarily stored in said memory contains data related to volume of a musical tone, and

said unnatural data is data which rapidly changes volume of a musical tone.

In the unlikely event that the transmittal letter is separated from this document and the Patent Office determines that an extension and/or other relief is required, Applicant petitions for any required relief including extensions of time and authorizes the Assistant Commissioner to charge the cost of such petitions and/or other fees due in connection with the filing of this document to **Deposit Account No. 03-1952** referencing docket no. 393032003100. However, the Assistant Commissioner is not authorized to charge the cost of the issue fee to the Deposit Account.

Respectfully submitted,



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